

What is claimed is:

1. An optical disk, to be reproduced by forming a light spot with a predetermined diameter thereon, comprising:
 - a substrate shaped in a magneto-optical disk, and having a recording surface;
 - a plurality of recording tracks formed substantially coaxially on the recording surface;
 - a plurality of information pits, which are recorded on said plurality of recording tracks as magnetization directions at said recording surface in a magneto-optical recording operation and are arranged with such a high pit density as to be non-reproducible by a normal resolution reproduction by use of the light spot but reproducible by a super resolution reproduction by use of the light spot; and
 - an address pit for address reproduction formed in advance to the recording operation on the recording surface with respect to one set of recording tracks adjacent to each other in a radial direction of the optical disk, having a convex or concave shape on the recording surface and being arranged with such a low pit density as to be reproducible by a normal resolution reproduction by use of the light spot.

2. An optical disk as set forth in claim 1, wherein said address pit is larger than said information pit in the radial direction of said optical [disc] disk.

3. An optical disk, to be reproduced by forming a light spot with a predetermined diameter thereon, comprising:

- a substrate shaped in a magneto-optical disk, and having a recording surface;
- a recording track including a plurality of lands and a plurality of grooves, and formed substantially coaxially on the recording surface;
- a plurality of information pits, which are recorded on both of the land and the groove as magnetization directions at said recording surface in a magneto-optical recording operation and are arranged with such a high pit density as to be non-reproducible by a normal resolution reproduction by use of the light spot but reproducible by a super resolution reproduction by use of the light spot; and
- an address pit for address reproduction formed in advance to the recording operation on the recording surface with respect to one set of the land and the groove adjacent to each other in a radial direction of the optical disk, having a convex or concave shape on the recording surface and being arranged with such a low pit density as to be reproducible by a normal resolution reproduction by use of the light spot.

4. An optical disk as set forth in claim 3, wherein said address pit is formed on said groove.

5. An optical disk as set forth in claim 3, wherein said address pit is formed on said land.
6. An optical disk as set forth in claim 3, wherein said address pit is formed such that the central axis of said address pit is positioned between the central axis of the groove and the central axis of the land.

7. An optical disk as set forth in claim 3, wherein said address pit is larger than said information pit in the radial direction of said optical [disc] disk.

8. An optical disk reproducing apparatus for reproducing an optical disk, to be reproduced by forming a light spot with a predetermined diameter thereon, comprising:

a substrate shaped in a magneto-optical disk, and having a recording surface; a recording track including a plurality of lands and a plurality of grooves, and formed substantially coaxially on the recording surface; a plurality of information pits, which are recorded on both of the land and the groove as magnetization directions at said recording surface in a magneto-optical recording operation and are arranged with such a high pit density as to be non-reproducible by a normal resolution reproduction by use of the light spot but reproducible by a super resolution reproduction by use of the light spot; and an address pit for address reproduction formed in advance to the recording operation on the recording surface with respect to one set of the land and the groove adjacent to each other in a radial direction of the optical disk, having a convex or concave shape on the recording surface and being arranged with such a low pit density as to be reproducible by a normal resolution reproduction by use of the light spot, said apparatus comprising:

an optical pickup for irradiating a read beam onto said optical disk to form the light spot with the predetermined diameter and reading information recorded on said optical disk;

a first driving means for searching the address pit corresponding to a desired land or groove by driving the optical pickup, and for driving the read beam to a recording position of the address pit when reproducing the information pit on the desired land or groove; and

a second driving means for driving the read beam to the desired land or groove from the recording position of the address pit.

9. An optical disk reproducing apparatus as set forth in claim 8, wherein said address pit is formed on said groove.

10. An optical disk reproducing apparatus as set forth in claim 8, wherein said address pit is formed on said land.

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11. An optical disk, to be reproduced by forming a light spot with a predetermined diameter thereon, comprising:

a substrate shaped in an optical disk, and having a recording surface;

a plurality of recording tracks formed substantially coaxially on the recording surface;

5 a plurality of information pits, which are recorded on said plurality of recording tracks at said recording surface in an optical recording operation and are arranged with a first pit density;
and

10 an address pit for address reproduction formed in advance to the recording operation on the recording surface with respect to one set of recording tracks adjacent to each other in a radial direction of the optical disk, having a convex or concave shape on the recording surface and being arranged with a second pit density which is lower than said first pit density.

12. An optical disk as set forth in claim 11, wherein a plurality of address pits each having a same construction as said address pit are formed on the recording surface such that one address pit corresponds, on one line in the radial direction of said optical disk, to said one set of recording tracks.

13. An optical disk as set forth in claim 11, wherein said address pit is larger than said information pit in the radial direction of said optical disk.

14. An optical disk, to be reproduced by forming a light spot with a predetermined diameter thereon, comprising:

a substrate shaped in an optical disk, and having a recording surface;
a recording track including a plurality of lands and a plurality of grooves, and formed
5 substantially coaxially on the recording surface;
a plurality of information pits, which are recorded on both of the land and the groove at
said recording surface in an optical recording operation and are arranged with a first pit density;
and
an address pit for address reproduction formed in advance to the recording operation on
10 the recording surface with respect to one set of the land and the groove adjacent to each other in
a radial direction of the optical disk, having a convex or concave shape on the recording surface
and being arranged with a second pit density, which is lower than said first pit density.

15. An optical disk as set forth in claim 14, wherein a plurality of address pits each
having a same construction as said address pit are formed on the recording surface such that one
address pit corresponds, on one line in the radial direction of said optical disk, to said one set of
the land and the groove.

16. An optical disk as set forth in claim 14, wherein said address pit is formed on said
groove.

17. An optical disk as set forth in claim 14, wherein said address pit is formed on said
land.

18. An optical disk as set forth in claim 14, wherein said address pit is formed such that a central axis of said address pit is positioned between a central axis of the groove and a central axis of the land.

19. An optical disk as set forth in claim 14, wherein said address pit is larger than said information pit in the radial direction of said optical disk.

20. An optical disk reproducing apparatus for reproducing an optical disk, to be reproduced by forming a light spot with a predetermined diameter thereon, comprising: a substrate shaped in an optical disk, and having a recording surface; a recording track including a plurality of lands and a plurality of grooves, and formed substantially coaxially on the recording surface; a plurality of information pits, which are recorded on both of the land and the groove at said recording surface in an optical recording operation and are arranged with a first pit density; and an address pit for address reproduction formed in advance to the recording operation on the recording surface with respect to one set of the land and the groove adjacent to each other in a radial direction of the optical disk, having a convex or concave shape on the recording surface and being arranged with a second pit density, which is lower than said first pit density, said apparatus comprising:

an optical pickup for irradiating a read beam onto said optical disk to form the light spot with the predetermined diameter and reading information recorded on said optical disk;

a first driving means for searching the address pit corresponding to a desired land or groove by driving the optical pickup, and for driving the read beam to a recording position of the

address pit when reproducing the information pit on the desired land or groove; and
a second driving means for driving the read beam to the desired land or groove from the
recording position of the address pit.

21. An optical disk reproducing apparatus as set forth in claim 20, wherein a plurality
of address pits each having a same construction as said address pit are formed on the recording
surface such that one address pit corresponds, on one line in the radial direction of said optical
disk, to said one set of the land and the groove.

22. An optical disk reproducing apparatus as set forth in claim 20, wherein said
address pit is formed on said groove.

23. An optical disk reproducing apparatus as set forth in claim 20, wherein said
address pit is formed on said land.